

Meeting Summary

October 19, 2012

1. Welcome and Introductions

The meeting was called to order at 9:00 a.m., October 19, 2012, by the Chair of the Delta Independent Science Board (ISB or the Board), Dr. Richard Norgaard. All members of the Board were present: Brian Atwater, Elizabeth Canuel, Tracy Collier, Edward Houde, Richard Norgaard, John Wiens, Judy Meyer, Jeffrey Mount, and newly appointed member, Harindra (Joe) Fernando.

None of the Delta ISB members made any new disclosures.

Delta Science Program (DSP) Staff in attendance: Peter Goodwin, Lauren Hastings, and Marina Brand.

2. Delta ISB Chair's Report

Norgaard summarized his presentation to the Delta Stewardship Council on September 27, 2012. Items included the ISB's transition from asking agency managers to attend their meetings to meeting with staff in their offices and in the field, the organization of program reviews by theme, and review of the Bay Delta Conservation Plan (BDCP) Environmental Impact Report/Impact Statement (EIR/EIS) and Plan. Norgaard also related a conversation he had with Alf Brandt regarding review of the BDCP EIR/EIS – the legislation specifies that the Board review and comment on the EIR/EIS and nothing in the legislation prohibits the Board from reviewing and commenting on the BDCP Plan as well.

Next, the new Delta Stewardship Council (DSC) Executive Officer, Chris Knopp, was introduced to the Board by Goodwin.

3. Delta Stewardship Council Chair's Report and Executive Officer's Report (taken out of order)

Knopp provided this report centered on his first impressions after two weeks on the job. He stated that science is an important component of the coequal goals and the Delta Plan. He strongly supports the use of adaptive management but understands the difficulties in implementing it and is looking forward to working with the Delta ISB in selecting the right path forward. He noted that the water and environmental communities are pushing for steady, visible progress. Knopp also recognizes that money is a limited resource and needs to be used efficiently.

Board members asked about the status of the Delta Plan and were told by Jessica Pearson from the DSC that a revised Plan and Supplemental Environmental Impact Report (SEIR) will be released for a 45-day public review period on or about November 7, 2012. Public review and rulemaking undertaken by the Office of Administrative Law (OAL) will occur simultaneously. When the Delta Science Plan is completed in 2013, it may become a part of the Delta Plan.

4. Lead Scientist's Report (taken out of order)

Goodwin provided this report and began by introducing Dr. Harindra Joseph Fernando ([click here for a short biography](#)), the most recent addition to the Delta ISB replacing Dr. Michael Healey. Goodwin then proceeded to update the Board on current activities of the Delta Science Program and the Delta Science Plan which include Brown Bag luncheon seminars; UC Davis Center for Aquatic Biology and Aquaculture (CABA) workshops planned for January 18, 2013 and Spring, 2013; participation in the State Water Board's update of its Bay Delta Plan; and the upcoming 2012 Long-term Operations Opinions Annual Review.

The Board discussed having Science Program staff prepare weekly summaries of what is going on to be sent to the members and/or have a website where the information could be found. Another member added that the Board should consider sending an ISB member to some of the independent scientific panel reviews or even be available to be part of a panel.

Next, Goodwin discussed the Delta Science Plan including the differences between science plans and science programs. Science Plans need to be the foundation of adaptive management programs. He next offered his vision which is "one Delta-one science". He also discussed components of other science plans that the Science Program had looked at.

Board member comments included the need to pay attention to ecosystem processes and functions, the need for performance metrics, how the NSF's SES (Science and Engineering) program provides grants to perform research and that this might be a funding avenue to conduct Delta science, and the necessity to build a science community based on trust observing that in the Delta there does not seem to be much trust among the stakeholders or between scientists and stakeholders.

The Delta ISB would like to have Science Plan status updates at every meeting and regular updates on coordination of all of the Delta science programs.

5. Discuss Delta ISB business matters

The Board delegated review of the Delta Science Program's Strategic Plan to Mount, Meyer, and Resh. They indicated that they would have their review completed by the November 29-30 meeting.

At the November 29-30 meeting, the members agreed that they would go on a field trip on the 29th and conduct it as a full Board; therefore, it will be open to the public. They also would like staff to investigate the possibility of meeting the afternoon of November 28, and to schedule a conference call to further discuss the field trip.

6. Discuss what members learned at the Bay-Delta Science Conference

The following is a summary of the comments made by Delta ISB members about the 2012 Bay-Delta Science Conference held in Sacramento on October 16-18.

- Some of the talks were quite good; however, others focused only on a single issue and neglected the larger view of the Delta. Single issue talks can and should be put into context.
- It should be remembered that research undertaken by master's and doctoral candidates are generally focused on single issues.

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- The sessions on fish were primarily focused on single issues but it is clear that the technologies used to study/monitor fish are maturing.
- There needed to be a big picture view of Delta food webs.
- Scientists working in the Delta should ask how the science will help the Delta.
- The Bay-Delta science conferences have improved over time and there has been a huge growth in scientific knowledge and quality. But now, syntheses of the information should be provided. This could take the form of a synthesis presentation for each session or the provision of at least one session that is devoted to synthesis.
- Conference organizers should consider defining the sessions first and then calling for papers.
- Each session should start with an overview.
- Research conducted by post-doctoral fellows should focus on synthesizing existing data and information rather than initiating original work.
- There should be more “grand challenges” types of talks. Consider a mini-symposium on one or two during the conference each ending with a panel discussion.
- Talks on forcings from outside of the system were very informative.
- The abstracts submitted for the conference should include statements of relevance.
- Approximately one-third of the talks were borderline irrelevant.
- The Landscape Ecology session danced around the fact that today the Delta is defined by its levees. More levee science should have been included in the conference. Was the lack of levee talks reflective of funding? Should the Delta ISB encourage more money for levee science?
- Talks on open source models should be included and all models need to be placed in perspective.
- Should a session composed of managers that talk about the type of information that they need to make decisions be considered? A manager’s panel on science? Would it be useful for Legislative staff to meet with scientists?
- If a session is focused on a policy issue, the session should open with an overview/synthesis of what is known and then how the session will address the current science.
- Overall, the conference was excellent and on a par with other national and international conferences.
- The conference organizers should consider one or two talks from outside of the system.
- There were some really good scientific talks but some of the science had high degrees of uncertainty and needed a more rigorous approach.
- The Delta Science Plan should discuss the role of the science conference as a mechanism for bringing scientists together.
- The conference is good for communication among scientists but not with policymakers and the public. The organizers might consider sessions on

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communicating science to a lay audience. Provide opportunities to scientists to learn how to communicate more effectively.

- Should the organizers consider preparing a synthesis report of the conference?
- Town Hall Meeting
 - Was a good experiment but should have been longer.
 - The discussion was chaotic, not organized, too short, started late, people came in and out. The format did not work and should be structured differently if done again.
 - There were too many people and there should have been a product that they could have reacted to. The meeting needed structure.
 - Might have been more effective if it had not been held on the first day of the conference.

7. Public Comment

Kurt Ohlinger, Sacramento Regional County Sanitation District stated that he thought that there did not seem to be enough time for questions after each talk at the conference.

This engendered additional discussion among the Board members including:

- The poster session was good and in retrospect, some of the talks on techniques might have been better as posters.
- Some conferences have five minute talks (about 8-10) then a 20 minute break to allow conference attendees to talk to the speakers.
- Need to stop thinking about posters as being second class. There is an increasing trend towards having more posters and fewer oral presentations because posters lend themselves to more discussion with conference attendees.
- The ISB should consider sending a memo to agencies, including the Delta Stewardship Council, about the benefit of hosting the conference and the necessity of continued funding so that agency scientists can attend.

Collier and Atwater agreed to draft a memo consisting of the ISB's comments on the conference.

Timothy Mussen, Sacramento Regional County Sanitation District suggested that it would be difficult for a new scientist to provide a synthesis (e.g., compare their work with all the other similar work being conducted) for each talk as it would probably be beyond their knowledge and ability.

Additional ISB comments included:

- This synthesis step is something that should be done before even starting the research.
- A miscommunication – the intent was not to compare one's work to others' but to describe how the work fits into the bigger picture.

8. Recap outcomes of the meeting

- Field trip – the Board will travel as one group but leave open the possibility that two members might splinter off and go elsewhere in order to cover more of the Delta.
- November 29-30 meeting – staff will explore the possibility of also meeting the afternoon of November 28.
- Teleconference – scheduled for November 2 from 12-1:30 p.m. PDT to discuss the logistics of the field trip. Staff should prepare field trip options including a smaller group on Wednesday; visit two or three sites on Thursday.

Discuss the Delta ISB Work Plan – The Board would like to complete the habitat review theme in December and discuss it in January. Release of the BDCP EIR/EIS is a large uncertainty that will affect the work plan as currently written. The Delta Stewardship Council also wants to see the charge questions.

- The ISB would like staff to prepare a calendar of upcoming opportunities such as conferences, workshops, local working group meetings, etc.; and send the Board more organized communications about activities, publications, etc.

9. Reflections from outgoing Delta ISB member, Jeff Mount

Mount made the following observations:

- The ISB should consider staggering their terms.
- Mount is the longest serving ISB member and has served under all of the lead scientists.
- The Science Program has good staff working in it.
- We work in the most complex, interesting system in the world.
- Policy does a poor job of incorporating science.
- Mount is concerned/disappointed about the following:
 - We are not further along after 11 years and \$2 billion and actually, some things are worse.
 - BDCP has been grinding away for six years and is not close to being done.
 - After 11 years of being involved with the Delta Science Program, it is still poor and doesn't have the resources needed to get the job done.
 - Disappointed that the stakeholder groups are unable to find the middle ground – the Tea Party model does not work.
 - There is a scientific ad hococracy. There is enough money and scientists but the effort is poorly organized.
 - “Sound science efforts” is equivalent to “science that sounds good”. This orientation does not solve problems.
 - Saw plenty of combat science at the conference. Single issue science ignores the other aspects of the system.
 - Oliver Wanger slaughtered the reputation of agency scientists – this was rock bottom.
- It is the responsibility of the scientific community to uphold adopted policies and provide information needed to develop future policies.
- Does not like the term “best available science”. Prefers science that is useful and used.
- Science is not able to solve all of the problems because of the associated political and social issues.
- The Delta Science Program should be the home for adaptive management, synthesis and analysis, the place for unified science planning, the place to resolve/negotiate scientific issues, and be trusted.
- Monitoring, data, and system models should all flow to the Delta Science Program.
- The state and federal water projects should be converted to a public utility.
- BDCP should not include a parallel science program.
- The Science Program should be expanded with agencies and the water contractors loaning their staff via Inter-agency Personnel Agreements (IPA). The program should be transparent and include a scientific advisory team not subject to open meeting laws.
- Need a lead scientist who is actually allowed to “lead science”.
- The Delta ISB should function more like a Board of Directors and aggressively advocate good science. There is a desire in the outside community for the Delta ISB to be more forceful and active. Think bigger and be decisive.

3:30 p.m. – Adjourned